

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
09/673,944	10/24/2000	Klaus-Dieter Blumenberg	Mo-5946/WW-5	8942	
34947	7590 07/14				
BAYER CHEMICALS CORPORATION			EXAMINER		
100 BAYER PITTSBURG	ROAD 6H, PA 15205		EINSMANN, MARGARET V		
			ART UNIT	PAPER NUMBER	
			1751		

DATE MAILED: 07/14/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

,							
	Applicati n No.	Applicant(s)	ĺ				
	09/673,944	BLUMENBERG ET AL.					
Office Action Summary	Examiner	Art Unit					
	Margaret Einsmann	1751					
Th MAILING DATE of this communication appears on the cov r sheet with the corr spondenc address Period for Reply							
A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, - Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). Status	36(a). In no event, however, may a reply be timed within the statutory minimum of thirty (30) days will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).					
1) Responsive to communication(s) filed on	<u> </u>						
2a) This action is FINAL. 2b) ☐ Th	is action is non-final.						
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.							
Disposition of Claims							
4)☐ Claim(s) <u>1-6</u> is/are pending in the application.							
4a) Of the above claim(s) is/are withdraw	wn from consideration.						
5) Claim(s) is/are allowed.							
6) Claim(s) <u>1-6</u> is/are rejected.							
7) Claim(s) is/are objected to.							
8) Claim(s) are subject to restriction and/or Application Papers	r election requirement.						
·· <u> </u>	.						
9) The specification is objected to by the Examine 10) The drawing(s) filed on is/are: a) accept	<u> </u>	miner					
Applicant may not request that any objection to the							
11) The proposed drawing correction filed on	• ,	` '					
If approved, corrected drawings are required in rep							
12) The oath or declaration is objected to by the Examiner.							
Priority under 35 U.S.C. §§ 119 and 120							
13) Acknowledgment is made of a claim for foreign	priority under 35 U.S.C. § 119(a)-(d) or (f).					
a) ☐ All b) ☐ Some * c) ☐ None of:							
1. Certified copies of the priority documents have been received.							
2. Certified copies of the priority documents have been received in Application No							
 3. Copies of the certified copies of the prior application from the International But * See the attached detailed Office action for a list 	reau (PCT Rule 17.2(a)).	_					
14)☐ Acknowledgment is made of a claim for domesti	c priority under 35 U.S.C. § 119(e) (to a provisional application	າ).				
 a) ☐ The translation of the foreign language pro 15)☐ Acknowledgment is made of a claim for domesting 	• •						
Attachment(s)							
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449) Paper No(s)	5) Notice of Informal F	(PTO-413) Paper No(s) Patent Application (PTO-152)					
I.S. Patent and Trademark Office							

Art Unit: 1751

DETAILED ACTION

This action is in response to the amendment filed 6/2/03. Claims 1-6 are pending.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 3 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The rejections as applied in the previous action under 35 U. S. C. 112 second paragraph have been mooted by applicant's amendment except as applied below.

Claim 3 line 2 recites "the dye liquor containing coloured pigments." There is no antecedent basis in claim 1 for that term. The examiner suggests that the above phrase be replaced with "the at least one dye in the dye liquor"

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 1,3-6 are rejected under 35 U.S.C. 112, first paragraph, because the specification, while being enabling for vat dyes, does not reasonably provide enablement for any other reduced dye which may be converted by oxidation to colored

Art Unit: 1751

form. The specification does not enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the invention commensurate in scope with these claims. For example, there is no enablement for dyeing with sulfur dyes or oxidation dye bases as are normally used in permanent hair coloration.

Response to Arguments

Applicant's arguments filed 6/2/2003 regarding the above rejection have been fully considered but they are not persuasive. Applicant argues by citing parts of the specification which give basis for the recitation of claim 1. However, the rejection is based on the fact that the only dyes which applicant discloses, and the only methods of reduction, refer to vat dyes. In fact on line I of page 5 applicant states, "surprisingly, it has been found that dyes, in particular vat dyes, which are convertible into alkali-soluble form, after chemical reduction, can in their alkali-soluble leuco form, be homogeneously mixed with viscose...." In that statement, applicant is stating that the aforementioned alkali soluble dyes are indeed vat dyes. Additionally, all of the dyes listed on page 5 lines 15-21 are vat dyes. there is no mention of any other type of dyes in the specification. Nor is there any teaching of how to reduce and mix any other type of dye into the viscose solution. Note the examples wherein vat dyes are reduced using reducing agents conventional for vat dyes, and then are homogeneously mixed into the viscose solution.

Claim Rejections - 35 USC § 103

Art Unit: 1751

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wearring et al. (Union Carbide), GB 1,038,945.

Patentees disclose a method of producing colored speck-free cellulosic films formed from viscose (p1 lines 16-17). They are used for making seamless regenerated cellulose tubing, with or without fibrous web imbedded therein, used for the processing and packaging of meat products. See page 6 lines 19-23 and 69-80. Applicant claims a method of producing dyed, tubular food wrappings from non-woven fabric coated with colored cellulose by a process of forming the leuco solution of a vat dye, mixing with viscose solution, and coagulating and regenerating the cellulose, and oxidizing the leuco dye. Patentee teaches at page 1 lines 50 et seq, "Adding a vat dye in the form of a leuco solution, i.e. reduced and solubilized, to viscose prior to extrusion also has not produced satisfactory results." That sentence teaches applicant's process except for the step of coating a non-woven fabric web with the colored solution.

It would have been obvious to the skilled artisan that the viscose solution colored with the vat dye as cited above is used to coat a fibrous web for the production of meat wrappings because patentee states that that is the intended use of the colored viscose solution. Since page 6 lines 19-23 disclose that said colored cellulose is generally

Art Unit: 1751

used with a fibrous web imbedded therein, all of the elements of applicant's claims are disclosed.

Regarding claim 2, all of the dyes disclosed therein are vat dyes, thus included in patentee's disclosure at page 1 line 50.

Regarding the limitations of claim 3, those are the conventional reducing agents for vat dyes. Patentee uses sodium hydrosulfite (dithionite) in the examples.

Regarding claim 4, it is within the skill of the artisan to vary the amount of coloring agent depending on the value of the tint desired. Additionally, one cannot tell the percentage of dye to viscose being claimed in claim 4.

Regarding the limit of claim 5, pigments are conventionally added to add opacity and deepen coloration. See patentees examples.

Regarding claim 6, CMC is a well known thickener in aqueous systems, and it is not inventive to use a composition for its known purpose.

Response to arguments

The above rejection is maintained as applicant's arguments are not persuasive. Applicant argues the rejection by agreeing that patentee teaches the method of dyeing a viscose film by dissolving a leuco vat dye in the viscose, and then oxidizing it before regenerating the cellulose, but states that since the reference teaches away from the process claimed, there would be no motivation to use the process which Wearring et al. disclose is the prior art process. Patentee teaches that the problems with the prior art process for dyeing viscose films, which is the same process applicant used to dye fiber-reinforced cellulose films, is that the leuco dye

Art Unit: 1751

solution in viscose requires special handling, and then he tells how to handle the solution in order for it to succeed. He states that the solution must be held at high temperature in the absence of air and that it cannot be used for producing dark shades. However he states that is a known process which has been used, and is still being used, to dye viscose films. He does not state however, that the process is used to dye fiber reinforced films of viscose. Patentee states that the viscose used in his improved process, which is a variant on the prior art process discussed on page 1, is viscose that is generally employed in the art for making seamless regenerated cellulose casings, with or without fibrous web embedded therein. Accordingly the prior art process may also be used, and has been used, with the same substrate. When the prior art process is used with a substrate of fiber reinforced viscose, that process is applicant's process.

Applicant further argues that an additional difference is that In accordance with the present invention, the process is used with less potent sodium sulfite in order to avoid secondary reactions of gel formation and blockage of the extrusion dies.

Regarding this argument, In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., reducing with sodium sulfite in order to avoid secondary reactions) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993). If the use of sodium sulfite in the reduction is critical, it must be included in the independent claim. Why is it claimed alternatively with sodium dithionite in claim 3?

Art Unit: 1751

Applicant further argues that carboxymethyl cellulose is necessary for the subsequent transparency and that other thickeners were not effective. (page 7 of response.) Why then does applicant claim in claim 6 that methyl cellulose may be used as an alternative to CMC?

Claims 1-6 are rejected under 35 U.S.C. 112, second paragraph, as failing to set forth the subject matter which applicant(s) regard as their invention. Evidence that claims 1-6 fail(s) to correspond in scope with that which applicant(s) regard as the invention can be found in Paper No. 8 filed 6/2/03. In that paper, applicant has stated that sodium sulfite must be used as a reducing agent and carboxymethyl cellulose must be used in the dyeing liquor, and this statement indicates that the invention is different from what is defined in the claim(s) because the claims do not require either of those two chemicals to be present.

Specification

The disclosure is objected to because of the following informalities: Page 4 last paragraph discusses the claims by numbers. This is not appropriate because the claim numbers change during prosecution. For example, claims 7-9 have already been canceled in this application.

Appropriate correction is required.

Response to Amendment

Applicant's response did not amend the specification to address the above objection to the specification. Accordingly the objection to the specification is maintained.

Art Unit: 1751

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Margaret Einsmann whose telephone number is 703-308-3826. The examiner can normally be reached on 7:00 AM -4:30 PM M-Th and alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Yogendra Gupta can be reached on 703-308-4708. The fax phone numbers for the organization where this application or proceeding is assigned are 703-

Art Unit: 1751

872-9310 for regular communications and 703-872-9311 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-0661.

Margaret Einsmann Primary Examiner Art Unit 1751

July 7, 2003